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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/730,887	12/10/2003	Noriko Sakashita	000466A	5155

38834 7590 06/03/2004

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EXAMINER	
EGWIM, KELECHI CHIDI	
ART UNIT	**PAPER NUMBER**
1713	

DATE MAILED: 06/03/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/730,887	SAKASHITA ET AL.	
	Examiner	Art Unit	
	Dr. Kelechi C. Egwim	1713	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *10 December 2003* .

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-4* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-4* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☒ Certified copies of the priority documents have been received in Application No. *09/530,202* .

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

a) ☐ The translation of the foreign language provisional application has been received.

15)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) *1&012604* .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: .

DETAILED ACTION

Claim Rejections - 35 USC § 102/103

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claims 1-4 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, 35 U.S.C. 103(a) as being unpatentable over Kishida et al. (JP 01215846), Tuzuki et al. (USPN 4,179,481), Matsuba et al. (US 5,093,420 or EP 392 465) or GB 1378434 for reasons cited below.

In the abstract, Kishida et al. teach two-stage polymer process additives to vinyl chloride resins, in concentrations of 0.05 to 25 parts per 100 parts of PVC, wherein the first stage, comprising 85-99 parts by weight per 100 parts of the two-stage polymers, is prepared from more that 60 wt% of methyl methacrylate and the second stage, comprising 1-15 parts by weight per 100 parts of the two-stage polymers, is prepared in the presence of the first stage polymer from acrylic acid esters.

Further, in page 4, section 12, Kishida et al. teaches that foaming agents may also be added to the vinyl chloride resins.

In col. 1, lines 10-12 and 55-68 and col. 2, lines 1-16, Tuzuki et al. teach two-stage polymer process additives to vinyl chloride resins, in concentrations of 0.1 to 100 parts per 100 parts of PVC, wherein the first stage, comprising 50-99 parts by weight per 100 parts of the two-stage polymers, is prepared from more that 85.71 wt% of methyl methacrylate and the second stage, comprising 1-50 parts by weight per 100 parts of the two-stage polymers, is prepared in the presence of the first stage polymer from acrylic and methacrylic esters except methyl methacrylate and 40 wt% or less of methyl methacrylate.

Further, in col. 3, lines 41-45 and col. 6, lines 4-9, Tuzuki et al. teaches that the two-stage polymers should preferably have specific viscosities of at least 0.5 and that additives such as foaming agents (blowing agents) may be added to the vinyl chloride resins.

Matsuba et al. [(US' col. 2, lines 42-68 and col. 3, lines 1-12) or (EP' page 3, lines 10-21)] teach two-stage polymer process additives to vinyl chloride resins, in concentrations of 0.1 to 30 parts per 100 parts of PVC, wherein the first stage, comprising 60-95 parts by weight per 100 parts of the two-stage polymers, is prepared from 50 to 95 wt% of methyl methacrylate and the second stage, comprising 5-40 parts by weight per 100 parts of the two-stage polymers, is prepared in the presence of the

first-stage polymer from 20 to 80 wt% of acrylic and methacrylic ester except methyl methacrylate, the balance being methyl methacrylate or other vinyl monomers, wherein the two-stage polymer has a specific viscosity of 1 or more.

Matsuba et al. [(US' col. 6, lines 60-65) or (EP' page 5, lines 39-41)] further teach that additives such as foaming agents (blowing agents) may be added to the vinyl chloride resins.

In page 2, lines 60-86 and the examples, GB 1378434 teach two-stage polymer process additives to vinyl chloride resins, in concentrations of 0.1 to 100 parts per 100 parts of PVC, wherein the first stage, comprising 50-99 parts by weight per 100 parts of the two-stage polymers, is prepared from essentially methyl methacrylate with optional minor amounts of other (meth)acrylate esters and vinyl monomers and the second stage, comprising 1-50 parts by weight per 100 parts of the two-stage polymers, is prepared in the presence of the first stage polymer from a mixture consisting essentially of acrylic and methacrylic ester except methyl methacrylate, with optional minor amounts of methyl methacrylate.

Further, in page 2, lines 107-111, and page 3, lines 94-98, GB 1378434 teaches that the two-stage polymers should preferably have specific viscosities of at least 0.5 and that additives such as foaming agents (blowing agents) may be added to the vinyl chloride resins.

While Kishida et al., Tuzuki et al., Matsuba et al. or GB 1378434 do not expressly teach the specific viscosity of the seed latexes, it is reasonable that the viscosity of the latexes would have been at least the value of the specific viscosity of the final polymer and would possess the presently claimed specific viscosities given the composition and preparation of the polymers are essentially the same as in the claimed composition. The USPTO does not have at its disposal the tools or facilities deemed necessary to make physical determinations of the sort. In any event, an otherwise old composition is not patentable regardless of any new or unexpected properties. In re Fitzgerald et al , 619 F.2d 67, 205 USPQ 594 (CCPA 1980). See MPEP § 2112 - § 2112.02.

Even if assuming that the prior art references do not meet the requirements of 35 U.S.C. 102, it would still have been obvious to one of ordinary skill in the art, at the time the invention was made, to arrive at the same inventive composition because the disclosure of the inventive subject matter appears within the generic disclosure of the prior art.

4. This is a continuation of applicant's earlier Application No. 09530202. All claims are drawn to the same invention claimed in the earlier application and could have been finally rejected on the grounds and art of record in the next Office action if they had been entered in the earlier application. Accordingly, **THIS ACTION IS MADE FINAL** even though it is a first action in this case. See MPEP § 706.07(b). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no, however, event will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dr. Kelechi C. Egwim whose telephone number is (571) 272-1099. The examiner can normally be reached on M-T (7:30-6:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on (571) 272-1114. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

KCE

KELECHI C. EGWIM PH.D.
PRIMARY EXAMINER